# 1996 Program Champions



# Congratulations WasteWi\$e Partners

his booklet features the achievements of the 1996 WasteWi\$e Champions - those companies being honored at the 1996 National WasteWi\$e Forum for their solid waste reduction successes.

Companies are being recognized for **Sustained Leadership in Waste Prevention** and for **Comprehensive Waste Reduction Programs**.

Based upon information and data from the WasteWi\$e Annual Reporting Forms, this

booklet highlights each Champion's WasteWiSe efforts with special emphasis on their waste prevention accomplishments. Company profiles may reflect only a portion of their overall waste reduction program. In most cases, companies are implementing additional waste reduction activities beyond the actions described.

EPA offers its congratulations to these WasteWi\$e Champions for their environmental leadership, and encourages other businesses to follow their outstanding example.

### Sustained Leaders in Waste Prevention

These Charter Partners have aggressively incorporated measured waste prevention practices into their core business operations. Companies include:

Bank of America
Baxter International

Bell Atlantic

**BellSouth Telecommunications** 

Chrysler Clorox

**Coors Brewing Company** 

**Dow Corning** 

E.I. DuPont de Nemours & Co.

General Mills Hewlett Packard Johnson & Johnson

McDonald's

Pepsi-Cola Company Procter & Gamble Stone Container Target Stores

### Comprehensive Waste Reduction Programs

These partners made notable progress in all three elements of the WasteWiSe program—waste prevention, recycling collection, and buying or manufacturing recycled products—in 1995. Companies include:

**Abbott Laboratories** 

Aetna Inc. Allergan Anheuser-Busch Apple Computer

Baltimore Gas & Electric

Bethlehem Steel

Betterworld/Planet Recycle

The Body Shop

Buckley's Quality Printing Co.

CITGO Petroleum

The Coca-Cola Company Compaq Computer Corp.

Eastman Kodak

EG&G

Ford Motor Co.
Fort Howard
General Motors
Georgia-Pacific Corp.

Gillette

Hallmark Cards HASBRO Herman Miller Ingersoll-Rand **Inland Steel** 

Louisiana-Pacific Corp.

Maytag Millipore Motorola

Mt. Bachelor Ski & Summer Resort Navistar International Transportation

**NEPTCO** 

Northeast Utilities

**NYNEX** 

Pennsylvania Power & Light

Perkin-Elmer Corp.

Public Service Electric & Gas

Radio Flyer Schlegel Corp. Silicon Graphics Sligo Adventist School

State Farm Mutual Automobile

Insurance Co.

Stonyfield Farms Yogurt Texas Instruments The Walt Disney Co. Herman Miller

Xerox

### **WasteWi\$e Waste Prevention Statistics**

Material Reduced (lbs.) 1994 1995
Paper 750,000 8,492,500

# **Bank of America Corporation**

Environmental Policies #5800 P.O. Box 37000 San Francisco, CA 94137

**Principal Contact:** Candace Skarlatos

### **Profile**

Bank of America has an aggressive waste prevention program that is focusing on innovative ways to reduce paper use. Bank of America has incorporated environmental responsibility and waste reduction into its core financial operations. With over 96,000 employees and all of its facilities participating in WasteWiSe, Bank of America has made a firm commitment to waste prevention through employee involvement and innovative ideas.

### **Outstanding WasteWi\$e Efforts**

- c Installed new printers with duplex capabilities that will reduce paper consumption up to 30 percent.
- c Initiated a pilot to suppress detail reports, which will reduce current output for these reports by more than 90 percent and will save more than 750,000 pieces of paper annually (7,500 lbs). \$185,000 will also be saved by eliminating the work time taken to review the reports.

- c Introduced new software-based "laser letterhead" that allows employees to customize corporate signature letterhead with personalized information, such as name, title, or address. Employees can update information quickly and output the exact quantity required, translating into a 56 percent cost savings over pre-printed letterhead.
- c Eliminated 250,000 pounds of paper for procedure manuals by condensing its branch reference libraries and making use of a telephone support center with full policy and procedure backup. The company saved 200,000 pounds of paper as a result of its campaign to encourage employees to make double-sided copies, carefully format documents, and pare down distribution lists.
- Bank of America's decision to return to printing the account reconciliation section of checking account statements on the back rather than the front decreased paper use by 300,000 pounds.

# **Baxter International**

One Baxter Parkway Deerfield, IL 60015

Principal Contact: William R. Blackburn

### WasteWi\$e Waste Prevention Statistics

 M aterials Reduced (lbs.)
 1994
 1995

 Packaging Materials
 7,700,000
 3,900,000

 Medical Supplies
 950,000
 790,000

### **Profile**

Baxter International, a leading producer, developer, and distributor of medical products worldwide, has made a firm commitment to reduce packaging and donate medical supplies to non-profit organizations over the past few years. The company has committed to working with its suppliers and customers to reduce packaging waste. In fact, 319 of the company's suppliers committed to reducing packaging and other waste as a result of Baxter's efforts in 1995. In addition to these initiatives, many Baxter facilities work actively with local communities to educate students on waste reduction.

### **Outstanding WasteWi\$e Efforts**

c During 1994 and 1995, donated a total of 1,740,000 pounds of surplus or short dated medical supplies and equipment worth over \$21 million to non-profit

- organizations. Since 1992, Baxter has been affiliated with AmeriCares, a non-profit organization that distributes medical supplies for relief efforts worldwide.
- c Reduced packaging in domestic facilities by 28 million pounds (21 percent) over a five-year period from 1990-1995. In 1995, Baxter saved 3.9 million pounds of packaging waste, resulting in a cost savings of \$4.7 million. In 1994, the company conserved an estimated 7.7 million pounds of packaging. These reductions have allowed Baxter to overachieve its 15 percent packaging reduction goal. Baxter has achieved its goal by reducing the average per-unit weight of its packaging and by promoting the use of reusable shipping containers.

# WasteWi\$e Waste Prevention Statistics Materials Reduced (lbs.) 1994 1995 Paper 6,200,000 Mixed Metals Telecomm. Equipment 8,000 200,000 Furniture 3,000

# **Bell Atlantic Corporation**

650 Park Ave.
Second Floor

East Orange, NJ 07017

**Principal Contact:** Maureen Burke

### **Profile**

Waste prevention pays off for Bell Atlantic, especially in its printing. One of its primary WasteWiSe goals has been to find ways to reduce paper use in telephone directories. Bell Atlantic has also successfully refurbished telecommunications equipment and has found secondary uses for furniture, furthering its commitment to waste prevention.

### **Outstanding WasteWi\$e Efforts**

c Changed specifications for telephone directories to reduce the amount of paper required, such as reducing the basis weights for incidental pages, including coupons, indexes, government pages, and showcase pages. The actual dimensions of the directories were also reduced, which, along

- with other changes, conserved 5.8 million pounds of paper in 1995.
- c Campaign to reduce copier paper usage achieved a 400,000 pound decrease in paper during 1995, saving \$300,000.
- c Increased the repair and redeployment of telecommunications equipment. This eliminated 208,000 pounds of mixed metal waste during 1994 and 1995.
- c Surplus furniture is evaluated and is either stored for reuse, donated to approved organizations, sold to outside customers, or scrapped for salvage value. By 1995, Bell Atlantic successfully eliminated the need to dispose of any furniture.

# **BellSouth Telecommunications**

675 W. Peachtree Street, N.E.

SBC 28L63

Atlanta, GA 30375

Principal Contact: Brenda Stirrup

wastewise waste	Prevention .	Statistics
Materials Reduced (lbs.)	1994	1995
Paper Wood Metal Plastic	3,000 14,100	1,353,500 459,000

WastaWisa Wasta Provention Statistics

### **Profile**

BellSouth Telecommunications provides telecommunications services throughout the Southeastern United States. The company has demonstrated a firm commitment to waste prevention by implementing paper reduction initiatives and donation programs that have eliminated millions of pounds of waste.

- c Eliminated the purchase of fiber optic wooden reels by purchasing cable on reusable steel reels only. Decreased wood waste by 459,000 pounds in 1995.
- Began printing double-sided customer bills in 1995. This activity reduced 1,346,000 pounds of paper and saved the company \$535,000.

- C Used electronic data interchange (EDI) to increase electronic billing by six percent in 1995, reducing paper consumption by 7,500 pounds and saving \$54,000.
- c During 1994 and 1995, the company conserved millions of sheets of printout paper and saved \$3.5 million by implementing an electronic filing system. BST's system of storing reports electronically enables employees to view, download, or print reports archived in the company's data centers from their own workstations. Implementing this system has helped the company conserve paper, improve efficiency, and reduce the need for paper storage.
- c Donated trash receptacles, binders, and video tapes to local schools and United Cerebral Palsy in 1994. This activity saved 3,000 pounds of metal and 14,100 pounds of plastic.

# **Chrysler Corporation**

800 Chrysler Drive East CIMS 482-00-51

Auburn Hills, MI 48326-2757 **Principal Contact:** Linda Plate

### **Profile**

Chrysler Corporation has made a corporate commitment to environmental protection and has stated that its goal is to eliminate, reduce, reuse, or recycle all solid waste generated at its facilities. More specifically, by reducing and reusing packaging and parts, Chrysler has achieved continuous success in waste prevention. To assist in meeting its goals, Chrysler developed a guidebook called "Packaging and Shipping Instructions" that provides detailed instruction on how to reduce and manage the packaging and shipping material used in its facilities.

### WasteWi\$e Waste Prevention Statistics

Materials Reduced (lbs.)	1994	1995
W ood	55,000,000	4,317,600
Corrugated	40,000,000	4,317,600
Plætic	5,000,000	2,198,800
Paper	150,000	137,496

### **Outstanding WasteWi\$e Efforts**

- Eliminated expendable packaging through the use of returnable containers and reuse of materials. This activity reduced corrugated, wood, and plastic packaging by 100,000,000 total pounds in 1994 and 10,794,000 total pounds in 1995.
- c Reduced the number of pages printed by Information Systems, achieving a 10 percent reduction in paper use between 1993 and 1994 and a 13.6 percent reduction between 1994 and 1995. During 1994 and 1995, Chrysler eliminated over 28 million pages of paper (287,000 lbs).
- c Reused plastic caps and plugs on engines and transmissions. This activity was investigated in 1994 and was implemented in 1995 with 40,000 pounds of plastic caps reused.

### **WasteWi\$e Waste Prevention Statistics**

Materials Reduced (lbs.)	1995
Corrugated PET Varrious Donated Materials Boxboard HDPE	3,028,000 281,000 100,000 27,200 7,300

# The Clorox Company

P.O. Box 493 7200 Johnson Dr. Pleasanton, CA 94566

**Principal Contact:** Terry Bedell

### **Profile**

The Clorox Company has achieved notable waste prevention success through its commitment to lightweighting, development of concentrated products, and packaging redesign. The company has implemented changes to some of its most popular product lines, and by doing so has achieved significant waste reductions and cost savings.

- c Developing concentrated products that will enable Clorox to reduce packaging. This project is being continued into 1996.
- c Lightweighted primary packaging. This activity saved 7,300 pounds of HDPE, 281,000 pounds of PET, and

- 27,200 pounds of boxboard in 1995. This included light-weighting of Pine-Sol and Kitchen Bouquet bottles and packaging.
- c Eliminated more than 3 million pounds of material by redesigning the corrugated cases used to transport products. This activity, combined with the lightweighting described above, saved Clorox over \$536,100 in 1995.
- c Implemented test product giveaway program that eliminated 100,000 pounds of various product wastes while providing free cleaners to several non-profit agencies.
- c Since the beginning of the WasteWi\$e program, the company's overall efforts have reduced waste by over 6 million pounds.

# **Coors Brewing Company**

Dept. BA300 Golden, CO 80401

Principal Contact: Joseph Ragno

WasteWi\$e Waste Prevention Statistics	
--	--

M aterial Reduced (lbs.) 1994 1995

Glass 53,308,000

Corrugated 423,600 6,834,000

### **Profile**

Coors Brewing Company, one of the largest producers of beer in the United States, has successfully incorporated waste prevention actions into its core distribution operations. The company's commitment to waste prevention is demonstrated by lightweighting and redesigning its corrugated bottle boxes, glass bottles, and 6-pack bottle carriers.

### **Outstanding WasteWi\$e Efforts**

- c Bottle lightweighting activities saved over 53 million pounds of glass in 1995.
- Reducing the bottom and top flap dimensions of bottle boxes eliminated over 6.8 million pounds of corrugated in 1995. In 1994, Coors saved 423,600 pounds of corrugated through lightweighting.

# **WasteWi\$e Waste Prevention Statistics**

Material Reduced (lbs.)	1994	1995
Steel Wood Polystynene Cotton HDPE	109 296 1,701,850 3,500	8,046,488 809,450 3,100 700 1,100

# **Dow Corning Corporation**

3901 South Saginaw Rd.

Mail Stop 065

Midland, MI 48606-0995

Principal Contact: Kim S. Hohisel

### **Profile**

Dow Corning's waste prevention success is attributable to significant changes in its transport packaging operations. Through its drum reconditioning and packaging reuse programs, Dow Corning reduced millions of pounds of wood and steel while saving millions of dollars.

- c Reused steel and plastic drums. Dow Corning reconditioned 150,000 steel drums in 1995, reducing 7.8 million pounds of steel, and saving \$2,298,000. The company saved \$1,060 and eliminated 1,100 pounds of HDPE by cleaning and selling plastic drums in 1995.
- Repaired and reused damaged wood shipping pallets. In 1995, Dow Corning removed 809,450 pounds of wood

- from the solid waste stream through this activity. In 1994, over 34,000 pallets were reused, eliminating over 1,701,000 pounds of wood.
- Reused polystyrene packaging peanuts from incoming shipments in outgoing shipments. This activity saved a total of 6,600 pounds of polystyrene in 1994 and 1995. In fact, in 1994, Dow Corning did not purchase any polystyrene packaging peanuts.
- c Replaced steel drums with refillable cylinders. In 1995, the company eliminated 246,500 pounds of steel by using the cylinders. In 1994, 1,518 steel drums were not used as a result of this program, resulting in a decrease of over 109,000 pounds of steel.

# E.I. DuPont de Nemours & Company, Inc.

Barley Mill Plaza Walker Mill Bldg Wilmington, DE 19880

**Principal Contact:** Bill Haaf

### **Profile**

DuPont's commitment to its corporate policy, "We will drive toward zero waste generation at the source," is clearly demonstrated by the company's waste prevention success. For the second year in a row, DuPont has recorded impressive waste prevention achievements through its packaging reduction, equipment reuse, and pallet reclamation programs.

### **Outstanding WasteWi\$e Efforts**

DuPont's Environmentally Improved Packaging Program, which has a goal to reduce product packaging by at least 50 percent by the year 2000, eliminated 16,573,000 pounds of

Material Reduced (lbs.)	1994	1995
Padkaging Materials	5,300,000	11,273,000
Excess Equipment	1,700,000	1,500,000
Pallet Wood	940,000	4,103,218

packaging during 1994 and 1995 through lightweighting, reusable packaging, and other activities.

- The company's equipment reuse program has allowed a total of 3,200,000 pounds of obsolete, damaged, or excess equipment to be either reused internally or sold for reuse. Furniture, computers, printers, and other electronic equipment are included in this program.
- The Pallet Reclamation Program eliminated 940,000 pounds of wood in 1994. By involving more of the company's businesses in the program in 1995, volume reductions jumped 330 percent for a total of 4,103,000 pounds of wood reduced in 1995.

### WasteWi\$e Waste Prevention Statistics

Material Reduced (lbs.)	1994	1995
Total Packaging Materials Corrugated Plastic Metal Foil Wap	24,000,000	42,000,000 38,294,000 1,342,000 860,000

# General Mills, Inc.

9000 Plymouth Ave. North Minneapolis, MN 55427 **Principal Contact:** Robert L. Esse

### **Profile**

General Mills continues to demonstrate its leadership in waste prevention. General Mills has made a firm commitment to WasteWi\$e by including all food plants, research and development, and headquarters operations in its WasteWi\$e reporting. In 1995, the company implemented packaging projects that conserved 42 million pounds, an increase from the already impressive 1994 level of 24 million pounds.

### **Outstanding WasteWi\$e Efforts**

- c Reduced product packaging material by shortening flaps on corrugated shipping containers.
- c Used less plastic in yogurt tubs, resulting in 980,000 pounds of plastic conserved.
- c Redesigned the shipping container for cereals, for a savings of over 16 million pounds of corrugated in 1995. This was

accomplished by using plastic straps to hold the cereal boxes tightly between just two pieces of corrugated. This new design reduces the amount of corrugated needed for the packaging by 30 percent. When first initiated, General Mills speculated that 3 million pounds of corrugated would be eliminated each year. The 16 million pounds saved in 1995 far exceeded this goal.

- c Foil cereal liner was changed on two brands, resulting in a decrease of 860,000 pounds of metal foil.
- c Initiated a reusable tote system for moving products from one location to another and transporting many incoming ingredients. This activity conserved 16,000,000 pounds of corrugated.

# **Hewlett-Packard Corporation**

1501 Page Mill Road M/S 5UE

Palo Alto, CA 94304

Principal Contact: Paul Quickert

### **WasteWi\$e Waste Prevention Statistics**

Material Reduced (lbs.) 1995

Tirk-Det Car tridge Packaging2,800,000Paper/Polystyrene Cups210,000Other Packaging86,000

### **Profile**

Hewlett-Packard is a leading manufacturer of electronic products and systems for measurement, computation, and communications. By making design changes to the packaging of one of these products, its ink-jet cartridges, the company conserved millions of pounds of packaging. The success of this activity and other waste prevention activities initiated by Hewlett-Packard exemplify the company's firm commitment to waste prevention and the WasteWiSe program.

### **Outstanding WasteWi\$e Efforts**

- c Redesigned the packaging for its ink-jet printer cartridges to use less material, resulting in a total reduction of 2.8 million pounds of various packaging materials.
- c Shifted from paper/foam cups to reusable mugs at coffee stations, reducing paper and polystyrene waste by 210,000 pounds.
- c Transition to using reusable containers for inbound materials conserved 86,000 pounds of packaging waste.

### WasteWi\$e Waste Prevention Statistics

Material Reduced (lbs.) 1994 1995

Padkaging Materials 21,915,000 29,822,000

Paper 750,000 443,000

# Johnson & Johnson

One Johnson & Johnson Plaza New Bruswick, NJ 08933 **Principal Contact:** Vivian Pai

### **Profile**

As a leading manufacturer and distributor of health care products, Johnson & Johnson handles millions of pounds of packaging each year. The company has demonstrated a firm commitment to reducing its packaging and has successfully eliminated over 51 million pounds of packaging waste in two years.

- c Reduced office paper usage by 443,000 pounds in 1995 and 750,000 pounds in 1994. This was accomplished by promoting duplex copying and the use of an electronic system.
- c Reduced the amount of packaging material used for products by over 51 million pounds in 1994 and 1995. This number includes primary, secondary, and transport packaging made of materials such as paper, plastic, and aluminum.
- c Developed PackTrack software that tracks, measures, and reports on a company's waste reduction activities. The software can monitor the waste reduction results from alterations in thousands of products or packaging materials simultaneously.

# **McDonald's Corporation**

McDonald's Plaza Oak Brook, IL 60521

Principal Contact: Robert L. Langert

WasteWi\$e Waste	Prevention	Statistics
Material Reduced (lbs.)	1994	1995
Paperboard LDPE	335,000 2,100,000	2,900,000
Mixed Paper	167.000	1,000,000
Corrugated Polypropylene	167,000	424,000

### **Profile**

McDonald's has demonstrated an ongoing commitment to solid waste reduction, continually evaluating its packaging to ensure that the most efficient packaging material is used. Among dozens of waste reduction actions implemented by McDonald's are significant changes to its food packaging. Over the past two years these changes have conserved more than 6.8 million pounds of materials.

### **Outstanding WasteWi\$e Efforts**

- c Replaced hash brown cartons with hash brown bags. This activity conserved 2.9 million pounds of corrugated and saved McDonald's \$3.8 million.
- c Reduced the basis weight of sandwich wraps, reducing mixed paper use by 1 million pounds and saving \$360,000.

- c Reduced the diameter of straws, resulting in a lighter weight straw. Eliminated 424,000 pounds of polypropylene and saved McDonald's \$450,000.
- c Reduced the back flap on large fry cartons, conserving 335,000 pounds of paperboard.
- Changed the case pack for 32-ounce cold cups and lids by utilizing the corrugated more efficiently. This effort eliminated 167,000 pounds of corrugated.
- c Reduced low density polyethylene (LDPE) usage by 2.1 million pounds by switching to a redesigned trash bag that is both stronger and thinner.

### WasteWi\$e Waste Prevention Statistics

Material Reduced (lbs.)	1994	1995
Corrugated	101,440,000	196,000,000
Aluminum	3,000,000	10,750,000

# The Pepsi-Cola Company

1 Pepsi Way

Somers, NY 10589

**Principal Contact:** Paul Boykas

### **Profile**

As a leading manufacturer and distributor of soft drinks, Pepsi-Cola Company has successfully implemented changes to its packaging that have eliminated millions of pounds of waste and saved millions of dollars. By making changes to its most essential product packaging, the soda can and the containers that transport them, Pepsi has demonstrated leadership in waste prevention.

### **Outstanding WasteWi\$e Efforts**

c Replaced one-way corrugated shippers with reusable plastic cases for 1 liter and 20-ounce packages. This activity elimi-

- nated 196 million pounds of corrugated and saved \$44 million in 1995 and eliminated over 101 million pounds in 1994.
- c Lightweighted aluminum cans. An additional 43 percent of Pepsi's system converted to the lightweighted lids. This saves 2 pounds of aluminum for every 1,000 cans. As a result of this activity, Pepsi conserved 10,750,000 pounds of aluminum in 1995 and 3 million pounds of aluminum in 1994.

# **Procter & Gamble**

2 Procter & Gamble Plaza Cincinnati, OH 45202

Principal Contact: Margaret Gerber

### WasteWi\$e Waste Prevention Statistics

Material Reduced (lbs.) 199

 Corrugated
 4,200,000

 PET/HDPE
 3,600,000

 Boxboard
 450,000

### **Profile**

Procter & Gamble, a consumer products manufacturer that ships millions of products each year, has actively identified and implemented diverse changes in several types of packaging. Continuing an ongoing commitment to packaging reduction, Procter & Gamble implemented waste reduction actions in 1995 that conserved more than 8 million pounds of primary packaging materials.

### **Outstanding WasteWi\$e Efforts**

c In 1994 and 1995, Procter & Gamble designed new packaging for Crisco Oil bottles that eliminates 2.5 million pounds per year of plastic and 1.3 million pounds per year of corrugated material. This reduction was achieved by

replacing the traditional cylindrical shape of the oil bottle with a rectangular design. By changing the bottle's geometry, a thinner layer of plastic can be used to deliver the same amount of oil. The resulting bottle uses 30 percent less plastic than before. In addition, by reducing storage space, the bottle's new design requires smaller shipping containers for transportation.

- Created new concentrated forms of hard surface cleaners that saved 1.1 million pounds of HDPE and PET and 2.9 million pounds of corrugated.
- Removed outer cartons from several skin care products.
   This activity saves 450,000 pounds of boxboard per year.

# WasteWi\$e Waste Prevention Statistics

Material Reduced (lbs.)	1994	1995
Corrugated Paper Fiber Adhesive	40,838,000	10,146,000 1,848,000

# **Stone Container**

1979 Lakeside Parkway Suite 300

Tucker, GA 30084

Principal Contact: Allen M. Koleff

### **Profile**

As a major manufacturer of corrugated packaging, Stone Container has demonstrated an active commitment to waste prevention through lightweighting, fiber reuse, and package redesign. These changes have conserved an impressive 57 million pounds of material in two years.

- In 1994, Stone Container decreased corrugated container manufacturing waste by more than 40 million pounds by redesigning products to eliminate waste during manufacturing, by lightweighting, and by reusing fibers recovered from waste water.
- c Reduced the amount of adhesive used in manufacturing corrugated boxes by over 1.8 million pounds in 1995 and over 4.6 million pounds in 1994.
- c Reused paper fiber in its container and paper manufacturing process, saving over 10 million pounds of material.

# **Target Stores**

33 South Sixth Street, CC-20E P.O. Box 1392

Minneapolis, MN 55440-1392 **Principal Contact:** Jim Bosch

### **WasteWi\$e Waste Prevention Statistics**

Material Reduced (lbs.) 1994 1995

Transport Packaging Materials 12,820,000 Plastic 3,000,000

Polypropylene 2,070,000 Mixed Paper 230,000

### **Profile**

Target Stores, a national chain of over 600 retail stores, continues to break new ground in waste prevention. Driven by its success and cost savings so far, Target has set a goal to become "trashless" in its softlines merchandise by 1996, which entails eliminating all unnecessary packaging as well as reusing the necessary packaging. In 1994, the company had reduced packaging waste by 79 percent, and in 1995, the company reached the 95 percent "trashless" level. These results are evidence of Target's clear and continuous commitment to waste prevention.

- c For Target's softlines merchandise, the company eliminated 3,000,000 pounds of plastic in 1995 (mostly bags used for primary packaging), adding to the 230,000 pounds of tissue paper and 2,070,000 pounds of polypropylene eliminated in 1994. The company has saved millions of dollars each year in reduced packaging materials costs and labor costs associated with unwrapping the merchandise. A key to this success was Target's strong partnership with its vendors.
- c Reduced the use of various transport packaging materials by 12,820,000 pounds in 1994.
- In 1994, Target continued its mission to go paperless by expanding the use of both electronic data interchange (EDI) and e-mail. This involved including new vendors in the policy of paperless purchase orders via EDI.

**Abbott Laboratories** redesigned its secondary packaging to reduce thickness while maintaining package strength. The health care company also donated more than 150,000 pounds of computers, lab equipment, and office furniture to charities.

**Aetna Inc.** initiated an office supply and equipment recapture program that conserved 8,500 pounds of office supplies and 120,000 pounds of office equipment. The program saved the company \$144,000. The insurance company also collected nearly 5 million pounds of recyclable corrugated, mixed office paper, wood, and construction waste.

**Allergan, Inc.**, saved \$2.4 million through packaging reduction efforts, including eliminating inner packaging from shipping containers, reducing packaging rejects through improvements in the production process, and lightweighting plastic product bottles. The company also purchased 1,365,000 pounds of high-grade paper with 15 percent postconsumer content for product inserts.

Anheuser-Busch Companies reduced its total solid waste by 26 percent or 45 million pounds in 1995. This reduction was a result of many waste prevention and recycling activities, including lightweighting of cans and glass bottles and converting from wood to plastic pallets. The corporate office complex increased office paper recycling by 14 percent and also saved \$36,000 by using coffee mugs and beverage glasses in the cafeteria rather than disposable cups.

**Apple Computer, Inc.**, reduced its use of disposable plastic forks and spoons, polystyrene cups, and cardboard trays in its cafeterias by 10 percent. Apple also increased its purchase of reusable plastic trays and ceramic cups and purchased 7,500 pounds of 100 percent postconsumer napkins for the first time.

**Bethlehem Steel Corporation** reduced its use of copier paper and high-grade office paper by duplex copying and improving the company's electronic data interchange transactions. These efforts saved Bethlehem Steel an estimated \$28,200. The company also collected 402,000 pounds of recyclables.

**Baltimore Gas & Electric** requested new gas meters to be delivered in shrink-wrap plastic instead of boxes, conserving approximately 65,000 pounds of corrugated and saving an estimated \$16,250. In addition, BG&E determined that recycled-content envelopes could be used for customer billing and still meet user specifications. The company will begin purchasing the envelopes next year.

The Body Shop purchased 100 percent refurbished furniture and work station partitions to provide work stations for 70 employees. The company also worked with a supplier to develop a recycled-content office supply catalog. The purchasing department has the authority to change a product an employee orders from virgin to recycled-content. In the winter, pallets that are no longer reusable are chopped into firewood for the elderly and poor.

Buckley's Quality Print Center donated scrap paper to area schools and plans to expand its donation program to include shipping peanuts, boxes and shipping supplies as well. Buckley's also began using fax post-it notes rather than cover sheets to reduce paper use, conserving an estimated 25 cover sheets daily as a result. The company has been stocking more recycled paper to be offered for all customer printing and copying jobs.

CITGO Petroleum Corporation conserved 753,000 pounds of paper by using electronic viewing methods. CITGO also conserved 350 pounds of paper by reducing the number of hard copies of material safety data sheets (MSDSs) for company products through on-line production and storage of MSDSs. By switching to electronic storage and retrieval for documents, CITGO also conserved 512 pounds of microfiche.

The Coca-Cola Company reduced the weight of its aluminum cans by 7 percent, saving 20,000 tons per year. The company purchased \$2 billion in recycled-content materials in 1995 and recycled more than 1.2 million pounds of corrugated, office paper, magazines, newspapers, aluminum cans, plastic bottles, and glass containers in the corporate office.

Compaq Computer Corporation reused the foam packaging inserts for selected refurbished computer products, saving an estimated \$62,000 in 1995. Compaq also placed employee bi-weekly newsletters and bulletins online, which conserved approximately 2 million pages of paper in 1995. The company installed double-sided copiers and increased its use of electronic communication to reduce the consumption of photocopy paper.

**Eastman Kodak Company** increased the return program for its Fun Saver Camera, encouraging photofinishers to return the cameras to Kodak for reuse and eventual recycling. Kodak also entered into a public partnership to develop waste prevention techniques to assist local Rochester, New York, businesses. Other partners include a local utility, the county environmental management council, and a local university.

EG&G conducted 11 waste minimization seminars for 185 employees in 1995. The workshops encourage employees to suggest and implement waste prevention measures. The employees examined ways to reduce wood, cardboard, paper, and metal. The company conserved 52,000 pounds of paper as a result of these employee education efforts. In addition, the company collected over 2.2 million pounds of recyclables.

Ford Motor Company was the first automotive company to issue worldwide automotive recycling guidelines to its suppliers and engineers. The company's North American plants collected over 700 million pounds of paper, plastics, metal, glass, and wood in 1995. The company also manufactures a variety of recycled products, including new taillight housings made from salvaged plastic bumpers and polypropylene splash shields made from old automotive battery casings.

**Fort Howard Corporation** redesigned the primary packaging used for a wiping towel system, reducing packaging by 66 percent. Fort Howard also redesigned transport packaging for a jumbo bath tissue system, which reduced packaging by 25 percent. The company also recycled more than 3 million pounds of metals in 1995.

General Motors Corporation supplies material safety data sheets (MSDSs) to dealers through a computer network rather than sending hard copies. General Motors can update the forms without having to distribute new hard copies as well. GM also achieved a 78 percent reduction in landfilled packaging waste from assembly plants between 1993 and 1996, a reduction from 82 pounds per vehicle to an average of 13 pounds per vehicle.

**Georgia-Pacific** used 108 million pounds of postconsumer material in its corrugated boxes and linerboard products at its Big Island facility. The linerboard is 100 percent postconsumer mixed paper; the corrugated boxes are made of old cardboard containers. The combined percentage of postconsumer content is 40 percent, up from 18 percent in 1994.

**The Gillette Company** donated 12,500 pounds of materials to Boston Schools Recycle Center. Teachers use the materials for experimental and innovative classes. In addition, Gillette donated more than 1,300 pieces of office equipment to local non-profits.

Hallmark Cards, Inc., saved \$300,000 through its waste reduction program, which included reducing office paper usage, reusing packaging, implementing a supply exchange, purchasing materials in bulk, viewing reports on-line and purchasing reusable carryout trays and reusable mugs for the cafeteria.

HASBRO, Inc., reduced the thickness of its polypropylene parts bags by 12.5 percent, saving an estimated \$10,000 in 1995. By reducing the thickness and material used in its shipping corrugated containers by 15 percent, HASBRO saved approximately \$400,000.

Herman Miller, Inc., purchased \$75,000 of returnable packaging made with 100 percent recycled-content HDPE and collected more than 13 million pounds of recyclables in 1995. The company also gave a leather travel bag to each fulltime employee as a gift to demonstrate the positive benefits of recycling scrap leather and to thank them for their commitment to improving the environment.

**Ingersoll-Rand Company** switched from wood pallets to reusable plastic pallets and other returnable containers and also rebuilds and reuses wooden pallets and skids. The company estimates that these waste prevention and reuse efforts enabled it to conserve 252,000 pounds of wood in 1995. Ingersoll-Rand also increased the amount of corrugated collected for recycling from 167,000 pounds in 1994 to 3,428,000 pounds in 1995.

**Inland Steel Company** made process improvements that reduced the consumption of 1 million pounds of virgin bauxite (aluminum). The company also developed a program to minimize and reduce transport packaging by nearly 20,000 pounds.

**Larry's Markets** promoted the reuse of kraft shopping bags and the use of smaller bags. These efforts helped Larry's conserve more than 262,000 pounds of kraft paper at its stores. Larry's also purchased more than 56,000 pounds of 50 percent recycled-content HDPE bags for the first time in 1995.

**Louisiana-Pacific Corporation** reused 20 million pounds of asphalt by mixing it with pavement materials for a log deck and lumber storage area in Ukiah, California, and by using it as a sub-base in paving a distribution center. The company also recycled more than 482 million pounds of wood by-products into marketable soil amendment products.

Maytag Corporation conserved 2,417,000 pounds of corrugated at one of its facilities, Newton Laundry Products, by reducing the amount of packaging used for finished products. At the Galesburg Refrigeration Products facility, the facility expanded the returnable container program, conserving 4,860,240 pounds of wooden pallets and 57,500 pounds of foam packing materials.

Millipore Corporation reground and reused plastic in molded product components, conserving more than 151,000 pounds of plastic in 1995 and saving the company \$177,000. In addition, the company achieved a 28 percent recycling rate in 1995 (an 80 percent increase from 1994). Millipore also donates used computer equipment to non-profit organizations.

**Motorola** collected cleanroom booties and gloves for reprocessing and reuse, conserving 139,600 pounds of mixed plastic clothing. By substituting refillable canisters for plastic and glass chemical bottles, the company conserved 164,600 pounds of glass and 13,100 pounds of HDPE.

Mt. Bachelor Ski and Summer Resort increased the postconsumer content in the paper napkins it purchases from 10 percent to 90 percent. Mt. Bachelor purchased 6,000 pounds of the napkins in 1995. The resort also collected more than 44,000 pounds of recyclables in 1995.

Navistar International Transportation Corp. purchased more than 1.5 million pounds of recycled-content products, including corrugated paper items, office paper, and products made from LDPE. By reusing packaging containers and materials and using returnable containers, the company also conserved 2 million pounds of wood in 1995.

**NEPTCO Incorporated** replaced corrugated secondary packaging used to separate products in boxes with thinner paper separators. This enabled the company to conserve 3,750 pounds and save \$30,000. NEPTCO also decreased scrap and nonconforming product levels, saving an estimated \$12,500 in avoided disposal costs.

Northeast Utilities Service Company distributed bulk mail reduction kits to 2,000 employees, showing them how to return unwanted mail with a letter requesting removal from the mailing list. The company also recycled 732 tons of corrugated and office paper, which helped Northeast Utilities avoid approximately \$44,000 in landfill and incinerator tipping fees.

**NYNEX** worked closely with local government agencies to initiate waste prevention programs at two NYNEX facilities. The company eliminated unnecessary computer reports printed by the centralized distribution facility, conserving more than 27,000 pounds of paper and saving over \$30,000. NYNEX also recycled an estimated 44.5 million pounds of material in 1995.

**Pennsylvania Power & Light** reused utility poles and cross ties and avoided disposing of 1,852,000 pounds of wood. The company also refurbished and reused wooden pallets and reels, eliminating over 492,000 pounds of wood, and donated mixed office paper to a local handicap worker workshop, which receives any revenues from selling the paper.

The Perkin-Elmer Corporation developed a packaging return program in which the company pays for shipping when customers return packaging to Perkin-Elmer for reuse. In 1995, the company eliminated 38,000 pounds of corrugated and 8,000 pounds of mixed plastics, saving \$40,000 as a result of this program. Perkin-Elmer also conserved 10,000 pounds of corrugated in 1995 by reusing intraplant packaging.

**Planet Recycle** reused paper products, purchased items with reduced packaging, and donated office furniture and supplies to local nonprofit organizations. The small consulting company also recycled 7,400 pounds of materials and contends that more than 93 percent of its office supplies contain the highest recycled-content available.

**Public Service Electric & Gas Company** implemented a corporate-wide waste accounting system to track and measure waste generated by the company. In addition, the company recently completed renovations on a 50,000 square foot warehouse to be used as a company resource recovery facility and materials exchange. The company also recycled over 25 million pounds of material.

Radio Flyer, Inc., eliminated its use of four color printed labels on each corrugated box by switching to direct printing on the box. This activity conserved 100,000 pounds of mixed paper. Radio Flyer's products are sold to customers in these corrugated containers. Radio Flyer also implemented a scrap exchange to sell excess scrap metal equipment, eliminating 125,000 pounds of steel.

**Schlegel Corporation** reduced its use of steel drums, which conserved 3,150 pounds of steel and saved the company \$2,000. Schlegel also eliminated 13,000 pounds of paper and saved \$7,000 by reducing the amount of computer printouts and reports by over 50 percent. This was accomplished by increasing e-mail use, downloading reports to disks, and sharing printed reports.

**Silicon Graphics** eliminated paper forms used for purchasing transactions by implementing the Electronic Purchase Requisition System. Now, employees can order and receive products and services through electronic means from their desks without a carbon paper trail. By placing its phone directory and financial policies manual on-line, Silicon Graphics eliminated 4,550 pounds of paper and saved \$10,000 on reduced paper and binding costs.

**Sligo Adventist School** purchased 10,750 pounds of 100 percent recycled-content plastic playground equipment, 22,000 pounds of 100 percent recycled-content rubber "fall zone" protective surfacing, and 4,000 pounds of 100 percent (50 percent postconsumer) recycled-content copier paper. In addition, implementation of a vermicomposting program at the school eliminated 1,000 pounds of cafeteria food waste.

### **State Farm Mutual Automobile Insurance**

Company eliminated over 23,000 pounds of high-grade paper by reducing the number of company phone directories published and by distributing employee fliers and notices on electronic mail instead of using paper fliers. State Farm also purchased nearly 30 million pounds of 20 percent recycled content paper products and began working with a paper mill that produces State Farm's general letterhead paper from its own paper waste generated in Bloomington, Illinois.

**Stonyfield Farm Yogurt** conserved over 40,300 pounds of polypropylene by lightweighting quart-size cups. Selling boxes for reuse rather than recycling them saved 138,717 pounds of corrugated. By recycling nearly 400,000 pounds of material, including plastic buckets, cups, and lids, office paper, steel drums, and wood pallets, Stonyfield Farm Yogurt reduced the net cost of handling its solid waste by an estimated 81 percent.

**Texas Instruments** reused wood pallets, semi-conductor shipping devices, and secondary packaging. These activities eliminated 200,000 pounds of wood waste and 60,000 pounds of plastic waste, enabling the company to save \$110,000 in 1995. Texas Instruments also recycled more than 40 million pounds of material in 1995, which reaped cost savings in excess of \$1 million due to avoided disposal costs.

The Walt Disney Company established a computerized set tracking system to allow for revamping and reusing production sets. This conserved 528,000 pounds of wood and saved \$528,000. The company also used theme park trash can liners made from a combination of Disney's old liners and other recycled-content material.

**Xerox Corporation** designed its photocopiers, cartridges, fax machines, and printers to be easily disassembled so that parts can be reutilized in new products. This conserved over 3.5 million pounds of plastic and 60 million pounds of metal. Xerox also reduced the packaging of its products and supplies, which conserved 3 million pounds of corrugated, 6 million pounds of wood, and 1.5 million pounds of plastic.